

SYSTEM AND METHOD FOR REDUCING THE DATA VOLUME OF IMAGES

Abstract of the Disclosure

5 A system and method for reducing the volume of data necessary to represent
an image by utilizing tiling and masking techniques is disclosed. Initially, an image
described by raster content having an original number of bits per pixel is provided.
The image is divided into tiles such that each of the tiles represents a portion of the
image. Then, for each of the tiles, the following steps are performed: (a) the colors
in the tile are identified; (b) the required number of masks are compared to a
10 threshold number of masks to determine if data reduction by using masks is
worthwhile; (c) if the required number of masks is less than the threshold number of
masks, a representation of the tile is generated using fills and/or masks; and (d) if the
required number of masks is greater than or equal to the maximum number of masks,
a representation for the tile using the original format and number of bits per pixel or a
15 smaller index is generated.